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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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EXAMINER

FERGUSON, MARISSA L

ART UNIT PAPER NUMBER

2855

DATE MAILED: 01/15/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/778,339

Applicant(s)

MERENDINO, PAUL A.

Examiner

Marissa L Ferguson

Art Unit

2855

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 06 November 2002.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-24 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-24 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 5
- 4) ☐ Interview Summary (PTO-413) Paper No(s) _____
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other:

DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claim 1 is rejected under 35 U.S.C. 102(b) as being anticipated by Yovichin (U.S. Patent 5,313,827). Yovichin discloses taking tire related measurements on a tire (Abstract), maintaining the pressure within a tire at a desired pressure (Column 2, Lines 59-61, Column 6, Lines 3-5, and Column 6, Lines 30-32), and compiling data from test runs (Abstract and Column 1, Lines 55-57).

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claim 1 is rejected under 35 U.S.C. 103 (a) as being unpatentable over Bezek et al. (U.S. Patent 6,278,363) in view of Winston et al. (U.S. Patent 5,472,032).

Regarding claim 1, Bezek et al. teaches a method of testing a tire comprising steps of taking tire related measurements (Abstract) and compiling data from multiple test runs (Column 4, Lines 22-27, and references made throughout pattern of multiple

steps). However, he does not specifically teach maintaining a pressure within a tire using a pressure –controlling device.

Winston et al. teaches a tire pressure maintenance system that discloses a system that maintains pressure within a tire at a predetermined pressure (Abstract). Since both Bezek et al. and Winston et al. are within the same field of endeavor, it would have been obvious at the time the invention was made to a person having ordinary skill in the art to modify the device taught by Bezek et al. to include the maintenance system as taught by Winston et al. for the purpose of maintaining and regulating pressure within a tire in order to provide for more accurate testing.

3. Claims 2-11 are rejected under 35 U.S.C. 103 (a) as being unpatentable over Bezek et al. (U.S. Patent 6,278,363) in view of Winston et al. (U.S. Patent 5,472,032) as applied to claim 1 above, further in view of Markow et al. (U.S. Patent 5,472,032).

Regarding claims 2,4-7, and 9, Bezek et al. teaches the invention claimed except for adjusting and releasing a gas at a desired pressure. Markow et al. teaches an inflation/deflation system that discloses adjusting and releasing a gas at a predetermined pressure (Column 4, Lines 15-31). Also with respect to claims 2, 4-7, and 9, a sensor compares and adjusts the mounting position, however it is obvious that any ordinary artisan skilled in the art can program a sensor to compare, adjust, and/or release a gas at any given specific tire pressure. The method and steps are also conventional in the art. Markow et al, does however disclose releasing a gas at a predetermined pressure of 50 psig (Column 4, Lines 22-24).

Therefore, since Bezek et al. and Markow both teach monitoring tire pressure, it would have been obvious at the time the invention was made to a person having ordinary skill in the art to modify the device taught by Bezek et al. to include a gas releasing system as taught by Markow et al. for the purpose of exhausting excess gas from a tire.

Regarding claims 3, 8, and 10, Bezek et al. teaches the invention claimed except a motion detector that determines if a tire is at rest, a solenoid valve, and a plate with instrumentation. Markow et al. teaches a tire inflation/deflation system that discloses a motion detector that determines if a tire is at rest (9,143), a solenoid valve (Column 4, Lines 44-47 and Column 5, Lines 45-50) and a plate with instrumentation (64).

Since Bezek et al. and Markow et al. teach tire maintenance systems, it would have been obvious at the time the invention was made to a person having ordinary skill in the art to modify the device taught by Bezek et al. to include the system as taught by Markow et al. for the purpose of regulating the system for wheeled vehicles with pneumatic tires.

4. Claims 12-19 and 21 are rejected under 35 U.S.C. 103 (a) as being unpatentable over Winston et al. (U.S. Patent 5,472,032).

Regarding claims 12-17, Winston et al. teaches a pressure controlling device comprising a tube (94), a valve (95), a pressure sensor (18), a controller 14), and a solenoid valve (Column 4, Lines 44-47 and Column 5, Lines 47-50). Winston et al. does not disclose opening and closing a valve at a specific pressure. However, he does teach the use of a controller valve that opens and closes to adjust at a target pressure

(Column 3, Lines 56-67, Column 4, Lines 26-34, and Column 4, Lines 44-53). Also, it is obvious that any ordinary artisan skilled in the art can program a controller to open and close a valve to adjust at any desired pressure.

Since Winston et al. teaches controlling a valve, it would have been obvious to one having ordinary skill in the art at the time the invention was made to control a valve at a specific pressure for the purpose of adding or removing gas easier.

Regarding claims 18 and 19, Winston et al. discloses a gas source, which can be opened to introduce a gas through a connection tube (Abstract) and a pressure setter (10).

Regarding claim 21, Winston et al. teaches a fluid source and a valve which can be opened to introduce a fluid source through a connection tube into a tire and wherein a controller opens the valve (Column 4, Lines 15-61).

5. Claim 20 is rejected under 35 U.S.C. 103 (a) as being unpatentable over Winston et al. (U.S. Patent 5,472,032) in view of Bezek et al. (U.S. Patent 4,582,108) as applied to claim 12 above, further in view of Markow et al. (U.S. Patent 5,472,032).

Winston et al. teaches the invention claimed except he does not disclose a motion detector. Markow et al. teaches a tire inflation/deflation system that discloses a motion detector (9,143). Since Winston et al. and Markow et al. teach tire maintenance systems, it would have been obvious at the time the invention was made to a person having ordinary skill in the art to modify the device taught by Winston et al. to include the system as taught by Markow et al. for the purpose of regulating the system for wheeled vehicles with pneumatic tires.

6. Claims 22-24 are rejected under 35 U.S.C. 103 (a) as being unpatentable over Winston et al. (U.S. Patent 5,472,032) in view of Bezek et al. (U.S. Patent 4,582,108).

Although regarding claim 22, Winston does not explicitly recite a tire testing system, he does not teach a tire monitoring system. The monitoring system monitors, controls, and maintains pressure within a tire at a desired pressure. Bezek et al. shows a tire monitoring/testing system that teaches similar arrangements. Specifically, he teaches an air pressure monitoring system that discloses taking and compiling test measurements/data to evaluate tire performance (Column 4, Lines 22-27, and references made throughout pattern of multiple steps).

Since Winston et al. and Bezek et al. are both systems that monitor air pressure, it would have been obvious at the time the invention was made to a person having ordinary skill in the art to modify the device taught by Winston et al. to include the system as taught by Bezek et al. for the purpose of monitoring pressure within tires.

Regarding claims 23 and 24, Winston et al. teaches a pressure controlling device that is mounted and rotates on a tire/wheel assembly of a vehicle (Column 3, Lines 4-16).

Response to Arguments

7. Applicant's arguments with respect to claims 1-24 have been considered but are moot in view of the new ground(s) of rejection.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Marissa L Ferguson whose telephone number is (703)

Art Unit: 2855

305-3194. The examiner can normally be reached on (M-T) 6:30am-4:00pm and every other (F) 7:30am-4:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Hezron Williams can be reached on (703) 305-4705. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 308-7722 for regular communications and (703) 308-7722 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-1782.

Marissa L Ferguson
Examiner
Art Unit 2855

Max

January 13, 2003


MAX NOORI
PRIMARY EXAMINER